U.S. ARMY CHEMICAL MATERIALS AGENCY www.cma.army.mil

CMA NEWS | September 2008

CMA PROGRESS AT A GLANCE

as of August 20, 2008:

Anniston Chemical Activity, Ala.: Since disposal operations resumed on Aug. 2, 2008, 2,169 VX M23 land mines have been safely destroyed and 24,076 pounds of VX processed. Anniston Chemical Activity employees have made 6,190 Enhanced On-Site Container deliveries to Anniston Chemical Agent Disposal Facility (ANCDF). Altogether, 88 munitions igloos have been emptied. ANDCF celebrated five years of safe disposal operations on Aug. 9.

Deseret Chemical Depot, Utah: Tooele Chemical Agent Disposal Facility has safely disposed of 2,271 mustard agent-filled ton containers and 54,651 mustard agent-filled 155mm projectiles. Mustard operations began in August 2006.

Newport Chemical Depot, Ind.: Newport Chemical Agent Disposal Facility's work force has safely neutralized all remaining chemical agent VX that was in the Newport Chemical Depot stockpile. More than 400 containers of hydrolysate have been safely shipped to Veolia Environmental Services in Port Arthur, Texas. Operations are now focused on decontaminating ton containers.

Pine Bluff Arsenal, Ark.: Pine Bluff Chemical Agent Disposal Facility is in a scheduled outage for changeover to mustard ton container disposal operations. The conversion continues for the Automatic Continuous Air Monitoring System for mustard agent detection. A planned shut-down for maintenance of all three furnaces will occur during the next several weeks. The furnace maintenance will include re-bricking the liquid incinerator.

Umatilla Chemical Depot, Ore.: The Umatilla Chemical Agent Disposal Facility (UMCDF) safely completed its 8-inch diameter VX nerve agent artillery projectile disposal campaign on Aug. 6. This completed disposal of 8-inch projectiles or "shells" in Oregon and the nation. During the next two months, UMCDF will change over to VX land mines, which are the last VX munitions in Oregon's stockpile.

Non-Stockpile Chemical Materiel Project: The Ton Container Decontamination Facility at Pine Bluff Arsenal (PBA), Ark., continues to process ton containers using the thermal decontamination system and has processed 1,136 containers. The Pine Bluff Explosive Destruction System continues to destroy recovered chemical warfare materiel stored at PBA and has completed disposal of more than 93 percent of the total project munitions and 86 percent of treaty declared munitions. The German Traktor Rocket Separation System project is in the final stages of coordination of the operational path forward.

CMA USES LESSONS LEARNED FROM JACADS AND ABCDF WHEN FACING CLOSURE CHALLENGES

As the U.S. Army Chemical Materials Agency (CMA) chemical demilitarization sites complete their missions, they will need to prepare for closure. Each site will be closed according to a detailed plan to ensure continued safety for the environment and surrounding communities. Depending on the needs of the U.S. Army, the disposal sites may be retained and restored to their natural condition, transferred to another federal government agency or transferred to the private sector for reuse through the Base Realignment and Closure process.

Closure will involve various facets – possible re-use of buildings, disposal of various wastes related to the project, reassignment or relocation of workers, dismantling and disposal of buildings that will not be re-used and sampling of structures to verify they meet regulatory standards.

The most recent chemical demilitarization site to begin the closure process is the Newport Chemical Agent Disposal Facility (NECDF), due to the elimination of their stockpile last month. The closure phase at NECDF is expected to take 18 to 24 months.

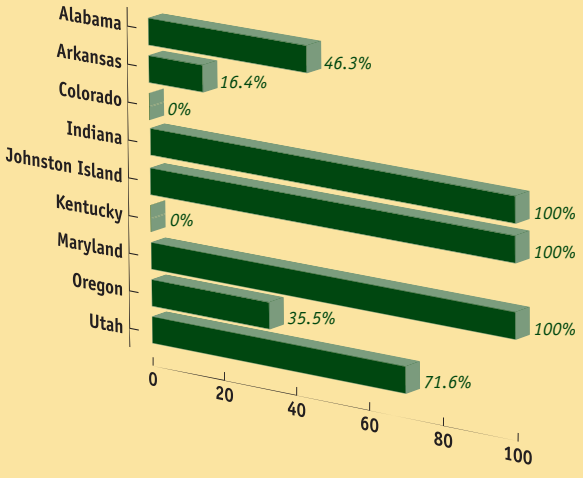
NECDF is the third chemical stockpile site to enter closure. Johnston Atoll Chemical Agent Disposal System (JACADS), southwest of Hawaii, completed operations in 2000, and Aberdeen Chemical Agent Disposal Facility (ABCDF), Maryland, closed in 2006.

JACADS was the first full-scale chemical weapons disposal facility in the world and valuable experience was gained during closure operations at this site. Cleanup, dismantling and demolition of the JACADS physical plant and surrounding buildings took almost three years, from early 2001 to November 2003. The land was restored to its original condition and is a wildlife sanctuary. The final step for JACADS closure – closure of the Resource Conservation and Recovery Act permit – continues.

ABCDF, however, has completed all stages of closure. Buildings that were not re-used were dismantled and disposed of and the land has been turned back to the garrison. The John Samuels Building, Ton Container Cleanout Control Room and Laboratory and Utility Building were signed over to the 20th Support Command. These buildings were cleared for use by the Directorate of Safety, Health and Environment. The future re-use of the land is undetermined.

As workers at the chemical demilitarization sites move closer to the elimination of all of the chemical weapons, challenges involved with closure move to the forefront. CMA and its contractors will meet those challenges, complying with stringent regulatory standards, while keeping safety as the top priority.

CMA - CREATING A SAFER TOMORROW



53.6%

OF U.S. CHEMICAL AGENT STOCKPILE DESTROYED

(as of Aug. 17, measured by original agent tonnage since entry into force – April 29, 1997)

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SAMPLING PROJECT COMPLETED SUCCESSFULLY AHEAD OF SCHEDULE

Workers at the U.S. Army Deseret Chemical Depot (DCD) in Utah recently completed removing chemical agent samples for analysis and measuring solid materials from each of DCD's original stockpile of nearly 6,400 mustard agent-filled bulk containers.

Under the joint project, Army civilians delivered bulk containers to special sampling facilities where EG&G Defense Materials contractors removed samples for analysis and characterization by site laboratory personnel. Originally scheduled to take three-and-a-half years to complete, workers completed the project 14 months early.

The sampling project confirmed that approximately 15 percent of the stockpile's mustard agent-filled bulk containers are contaminated with elevated levels of mercury. As a result, construction is under way on an additional furnace exhaust gas filtration system utilizing sulfur-impregnated carbon to capture mercury when processing the chemical weapons.

Another important component of the sampling project measured the amount of solid or semi-solid residue, referred to as "heels," within each bulk container. After the liquid is drained from the bulk containers, the solid residue remains, making the heels heavier than Utah regulatory officials allow for bulk container processing through the Tooele Chemical Disposal Facility (TOCDF) Metal Parts Furnace. The sampling measurements will enable a new Heel Transfer System, inside the TOCDF plant, to reduce the weight of the heels for safe processing.

EG&G Sampler/Operator Russ Peterson prepares to draw a chemical agent sample from the last DCD mustard agent-filled bulk container.

"This was a critical project and a very successful one," said Ted Ryba, TOCDF Site Project Manager. "Everything we did was based on a need to know what was inside those bulk containers and because of our joint EG&G/DCD sampling project, we now know. It is information we need to help us complete our mission of safely eliminating the entire DCD chemical weapons stockpile."

NSCMP SUPPORTS OPERATIONS AT SCHOFIELD BARRACKS

The U.S. Army Non-Stockpile Chemical Materiel Project (NSCMP) recently completed support operations at Schofield Barracks, Hawaii, facilitating the destruction of recovered chemical warfare materiel (RCWM). NSCMP was tasked by the office of the Deputy Assistant Secretary of the Army for Environment, Safety and Occupational Health, DASA (ESOH), to provide operational planning and testing of the Transportable Detonation Chamber (TDC) TC-60. The TDC explosively treats RCWM on site in a blast containment vessel, while capturing any vapor with redundant air filtration systems. Operators treated the last of the 71 recovered items on July 30, with an outstanding safety and environmental record. NSCMP worked with Schofield Barracks to extensively coordinate the destruction effort with local, state and federal agencies, including the Centers for Disease Control, Environmental Protection Agency, Department of Health and Human Services, Hawaii State Department of Health and the City and County of Honolulu. This deliberate and collaborative effort ensured safeguards were in place to protect the health of the community and the environment.

Operations were enhanced by NSCMP's prior non-intrusive assessment operations, which allowed for the safe handling and storage of the items awaiting treatment. Waste resulting from the operation was labeled and transferred to a permitted treatment, storage and disposal facility. The TDC has now been removed from the site and packaged for shipment back to the mainland for future destruction operations.

ANNISTON COMPLETES VX-FILLED PROJECTILES;

begins last nerve agent campaign

The first of several thousand M23 VX-filled land mines were processed on Aug. 2 at Anniston Chemical Agent Disposal Facility (ANCDF).

On May 24, officials at the Anniston Army Depot announced the completion of the last VX-filled 155 mm projectile processed through the Metal Parts Furnace at the ANCDF.

This was a major accomplishment for the facility and allowed them to move into the last phase of nerve-agent disposal, M23 VX-filled land mines.

To prepare for processing land mines, the facility completed a changeover operation, which lasted nine weeks. The changeover involved removal of unused equipment and the installation of new robotic mine processing equipment. During the changeover, employees were trained on proper operating and safety procedures to ensure the safe disposal of the final nerve agent munitions—safe for the employees, public and environment.

This final nerve agent campaign at the depot is expected to last one year. Initial operations will be slow to ensure safety and compliance with environmental permits and security requirements. The site is expected to increase the destruction rate of the land mines when approval is received from the Alabama Department of Environmental Management.

The ANCDF Pollution Abatement System Stack.

CMA News is produced by the U.S. Army Chemical Materials Agency Public Affairs Office.
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